Expedition Edition Aerial Kit Contents List

Congratulations on your purchase of a DSLRPros Sundance Edition Aerial Kit. Inside your Special Edition Travel Backpack you will find the following items with numbers that correspond to the kit image on the following page.

1. A/C Power Cable For LiPo Multi-Charger
2. DSLRPros TXS-8 Pro LiPo Charger
3. Charging Harness For LiPo Battery With Car Adaptor
4. DJI Phantom 2 With 3-Axis Gimbal Pre-Installed
5. DJI Phantom 2 Quick Start Guide
6. DSLRPros Lanyard For Futaba Transmitter
7. Set Of 2 DJI Smart Flight Battery Chargers
8. 2 LiPo Batteries For Futaba Transmitter (1 Shown)
9. Set Of 4 DJI Smart Flight Batteries (2 Shown)
10. Set Of 2 Micro-USB Cables
11. A/C Power Cables For DJI Smart Flight Battery Chargers
12. Antenna Set For FPV Field Monitor (Long Range Antenna Not Pictured)
13. Futaba Transmitter
14. Cables For FPV Field Monitor
15. Propeller Guards
16. Set Of 4 Self-Tightening Propeller Blades (Carbon Fiber Blades Not Pictured)
17. String For Propeller Guards
18. Anti-Drop Pins For Gimbal
19. International Plug Set
20. Field Monitor Charger
21. A/C Power Cable For Field Monitor Charger
22. DSLRPros 7" FPV Field Monitor
23. Sun Shade For FPV Field Monitor
24. Set of Spare Gimbal Vibration Absorbers
25. 5.8 GHz Patch Antenna For FPV Field Monitor
26. Philip's Head Screwdriver
27. Set Of Spare Screws and Propeller Wrench

Items Not Pictured

- DSLRPros LiPo Checker
- GoPuck Battery With DJI Car Charger Adaptors
- ND/CP GoPro Filter Pack
- 4 DJI OEM Motors (With Bullet Connectors)

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2
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4
5
DSLR Pro
TXS-8 PRO
Stop
Dec.
Inc.
Enter
FC CE
DJI REWARD CLUB
REWARD POINT REGULATION
PHANTOM 2
QUICK START GUIDE
6
7
8
TX 2600
9
10
11
12
13
14
15
16
Futaba
T8FG
SUPER
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PLEASE READ ALL TOPICS BEFORE POWERING ON FOR FIRST TIME

New pilots should **NOT** fly the Phantom 2 with the Gimbal attached until they have had at least 10 hours of flight practice. Refer to the Zenmuse H3-3D operator's manual for installation and removal instructions (found on www.dji.com).

DJI Phantom 2 Wiki: http://wiki.dji.com/en/index.php/Phantom_2
DJI Phantom 2 Videos: http://www.dji.com/product/phantom-2/video

For DSLRPros videos please visit our YouTube Channel
Link: http://www.youtube.com/channel/UCJUVqDvAzr1jbdrmhxsH7jw

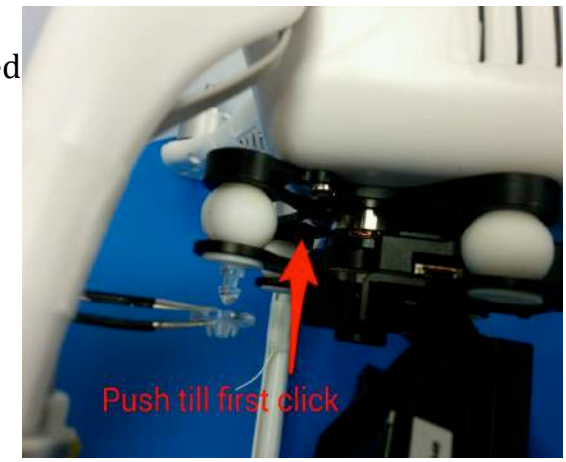
1. Turning On Your Transmitter and Phantom 2
2. Advanced Calibration
3. Compass Calibration
4. LED Break Down
5. Using The FPV Monitor
6. GoPro Shooting Preferences
7. Flight Modes
8. OEM Phantom Controller/Transmitter (If Applicable)
9. Futaba Controller/Transmitter (If Applicable)
10. Propeller Installation
11. Gimbal Installation & Removal
12. Updating Your Software
13. Battery Safety
14. Using ESCs and Motors with Bullet Connectors

WARNING:

DO NOT fly with zip ties attached to Phantom 2. Zip ties are installed for shipping purposes only.

DO NOT use WiFi with the GoPro on the Phantom 2. This will cause the pilot to lose control over the craft and result in a flyaway.

DO NOT power on the Phantom 2 without a GoPro attached to the gimbal. This will damage the gimbal and render it unusable.



Be sure to add the anti-drop caps to the gimbal before flying with the gimbal attached.

It is the owner's responsibility to be certain that the propeller blades are attached properly and securely fastened before every flight.

1. Turning On Your Transmitter and Phantom 2

- Always turn on your transmitter before turning on your craft. To turn on our transmitter press the power switch to the "on" position. Before turning on your transmitter, make sure your throttle is all the way down and the toggle switches are in the uppermost position.
- To turn on your Phantom 2 insert the DJI Smart Flight Battery into the craft, press the circular power button once, then press again and hold until the Power Light on the battery turns red.

2. Advanced Calibration

Make sure the settings have been properly adjusted so that the Phantom 2 can run with the best performance possible.

- Plug the Phantom into your PC or Mac using the USB cable provided.
- Power on the transmitter with the throttle all the way down.
- Power on the Phantom.
- Open the DJI Phantom Application.
- Go to the “Tools” tab.
- Click “Advance.”
- Make sure there is no metal anywhere around the compass.
- Do not touch the table that the craft is on and make sure it is very still.
- Click “advanced cali.”
- When a box pops up that says “power down MC” ignore it, click OK, and do not touch anything.
- When the advanced calibration has completed successfully, a green check mark will appear to the right of the status bar.

3. Compass Calibration

It is important to calibrate your compass outdoors every time you fly your craft. This allows the Phantom 2 to track its own position from multiple satellites and ensures optimal performance.

- Set the Phantom 2 on a flat surface.
- With the throttle down and all switches in the uppermost position, power up the transmitter and then power up the Phantom 2.
- Wait until the Phantom 2 has full GPS lock. You will know the Phantom has full GPS lock when the LEDs under the Phantom's arms are green and blinking.
- Flip the flight mode switch from “GPS” to “Atti” five times in a steady motion until the lights on the underside of the craft turn a solid, unblinking yellow.
- Pick up the Phantom 2 (do not hold by compass).
- Hold the Phantom 2 straight out and turn your body in a complete circle until the lights turn from yellow to solid green.
- Stop turning.
- Rotate the Phantom 2 vertically so that the USB port is facing straight down and repeat your 360-degree rotation until the lights blink green again.
- Place the Phantom 2 back on the ground and look to see that there are only green blinking lights. If not, repeat the process.

4. LED Break Down

This list will help users understand the meaning of some of the different LED light combinations on the Phantom 2. Please refer to your DJI Phantom 2 manual for more information.

- Power On Self Test: Red Green Yellow Flashing
- Initialization: Alternating Green and Yellow Flashing
- Ready To Fly: Consistent Green Flashing
- Signal Loss: Consistent Yellow Flashing
- 1st Low Battery Indication: Slow Red Flashing
- 2nd Low Battery Indication: Rapid Red Flashing
- Compass Calibration Necessary: Alternating Red and Yellow Flashing
- DO NOT fly with any red lights at all.

5. Using the FPV Monitor

DO NOT power on your FPV monitor or transmitter without attaching the proper antennae. In order to function properly, your FPV monitor and Transmitter must be set to the same band and channel. Follow these steps to properly establish the FPV connection. Not following these steps may result in poor image quality or damage to the system.

- The FPV transmitter can be found on the outside of your craft. It is the small rectangular circuit board with one black button. Press and hold the button until letters begin to flash on the transmitter's display (A, B, E, and F)
- Press the button once to select your band.
- Press and hold the button until numbers return to the screen.
- Press the button to select a channel.

To turn on the FPV monitor, press and hold the power button until the DSLRPros logo is displayed on the screen. The menu can be accessed by quickly pressing the power button twice. Scroll through menu options using the up and down buttons. Select your option using the "M" button.

- Open the FPV monitor's menu by pressing the power button twice.
- The down arrow to select the RF menu (Small T.V.)
- Press the M button to view your band and channel settings.
- Press the M button again to select the band. Press the up or down buttons until the monitor's band is the same as that of the transmitter's.
- Press the power button to return to the previous screen and repeat the process until all bands are the same.
- Press the power button to exit out of the menu and use the +/- buttons to change the channel until your receiver's channel is the same as the Transmitter's.

Once you have matched the bands and channels on the receiver to the transmitter and powered on your GoPro, image from the GoPro will be visible on your screen.

The monitor and the GoPro must both be placed in the same video system (NTSC in the USA and PAL in Europe) to function properly. Use the following steps to change the video system on your monitor.

- In the menu, press the down arrow until you reach the Function menu (Crossed Tools).
- Press the M button to enter the Function menu and press the down arrow until Video System is highlighted.
- Press the down arrow to select NTSC or PAL.

6. GoPro Shooting Preferences

The GoPro has an array of different shooting modes and settings. This can be overwhelming for users who are not accustomed to using a GoPro, so here is a quick reference guide on our recommendations for different shooting conditions.

- Overall best shooting: 2.7k, 30 FPS,
- Low light shooting: 1080P 30 FPS, Wide, No Pro tune
- Slow motion: 1080p at 60 fps (any setting at a higher fps than 60)
- Put all GoPro footage through "CineForm" before putting it into any other editing program.

The monitor and the GoPro must both be placed in the same video system (NTSC in the USA and PAL in Europe) to function properly. Use the following steps to change the video system on your GoPro.

- Power on the GoPro by pressing and holding the power button.
- Press the power button until you come to the settings menu appears on the GoPro's screen (Wrench). Press the record button to enter the settings menu.
- Press the power button until you reach the setup menu (Two Gears). Press the record button to enter the setup menu.
- Press the power button until you see NTSC/PAL. Press the record button to enter the menu.
- Press the power button to select the desired video system. (NTSC in the USA and PAL in Europe).
- Press the power button until you reach the exit option and select with the record button to leave the menu pages.

7. Flight Modes

The Phantom 2 comes with multiple flight modes that allow users to control the craft in many different ways.

- Attitude Mode: Maintains altitude but the craft will keep moving in one direction when influenced by wind or momentum.
- GPS Attitude Mode: Maintains altitude and position. Even if acted upon by an outside force like wind, the craft will return to its last location (where the user let go of the sticks).
- IOC Mode: No matter the position of the Phantom 2, the directional controls will always remain the same.

8. OEM Phantom Controller/Transmitter (If Applicable)

The Phantom OEM Controller/Transmitter is the default transmitter for the Phantom 2. Refer to the DJI tutorials and User Manual for flight controls and information.

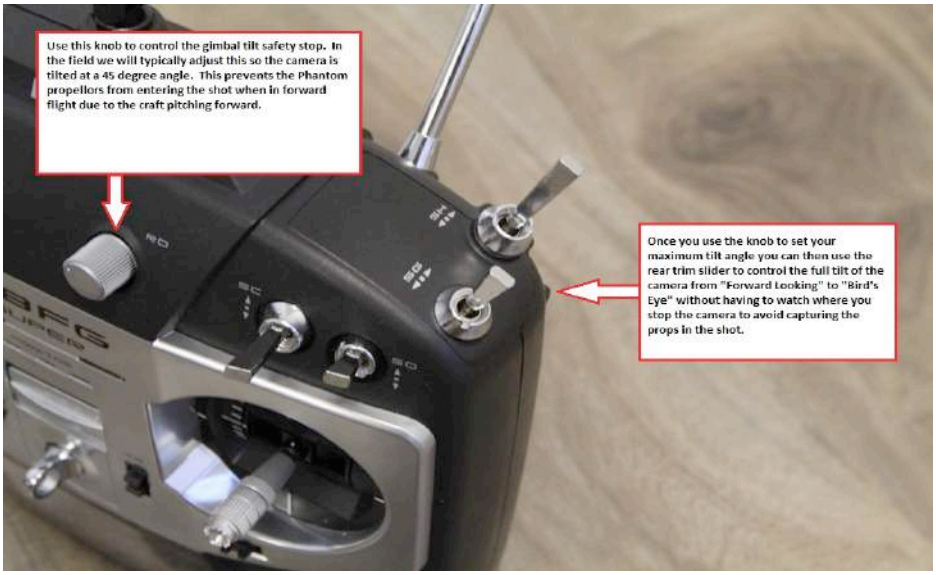
The DSLRPros Lanyard attaches to the OEM Phantom Transmitter by the silver loop above the power switch.

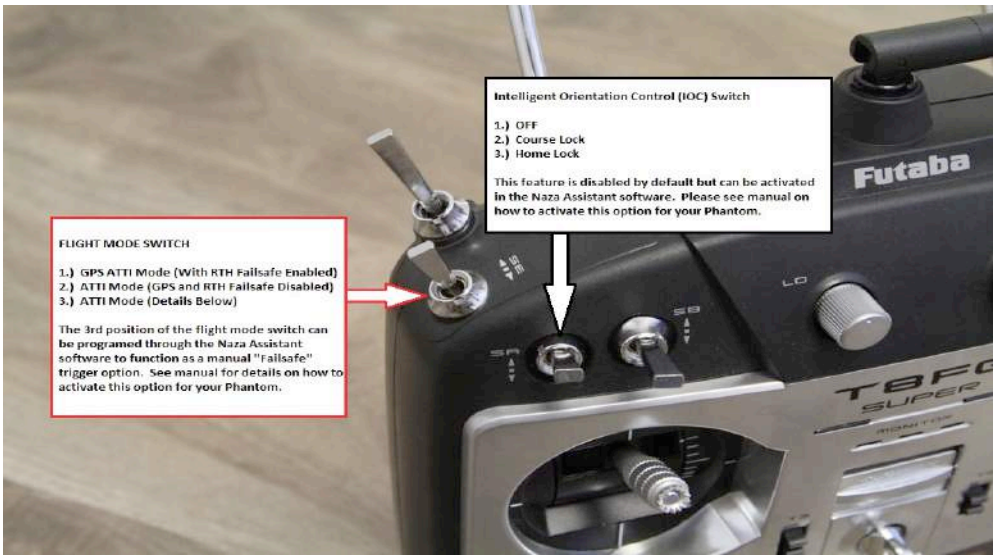
9. Futaba Controller/Transmitter (If Applicable)

The Futaba controller is the ideal controller for DSLRPros aerial kits. This is an upgraded controller that provides more flight options when piloting the Phantom 2.

The LiPo charger is meant to charge the LiPo battery only. **NEVER** charge a LiPo battery with any charger that is not a LiPo battery charger. Incorrect charging can cause damage.

- Left Stick: Located on the left hand side of the transmitter, pressing up and down on the throttle controls vertical movements. Pressing left and right on the throttle stick causes the aerial to rotate clockwise or counter-clockwise.
- Right Stick: Located on the right hand side of the transmitter, the right stick controls forward and backward movement and left and right horizontal movement.
- To turn on the motors for your craft, move both the left and right control stick all the way down and towards the center of the transmitter. Release the sticks when the motors begin to spin.
- SA Toggle Switch: This is the Intelligent Orientation Control (IOC) mode, which is NOT enabled by default. This switch is located on the left side of the transmitter just above the throttle control.
- SE Toggle Switch: This controls the flight mode. This switch is located on the top, left hand side of the transmitter. See the "Advanced NAZA Assistant Manual" for further details.
- SH Toggle Switch: This is the timer reset. This timer is set to warn the user when to start landing the Phantom. This switch is located on the top, right hand side of the transmitter.
- RD Knob: This sets the gimbal stopping point for the tilt. The trim slider on the rear, right side of the Futaba controls the tilt. The RD knob is located on the front of the transmitter, above the power switch.
- SD Toggle Switch: The Dual Rate option on the Futaba allows users to limit the overall speed at which the Phantom can operate through the "Fluid Slow Pan" mode.

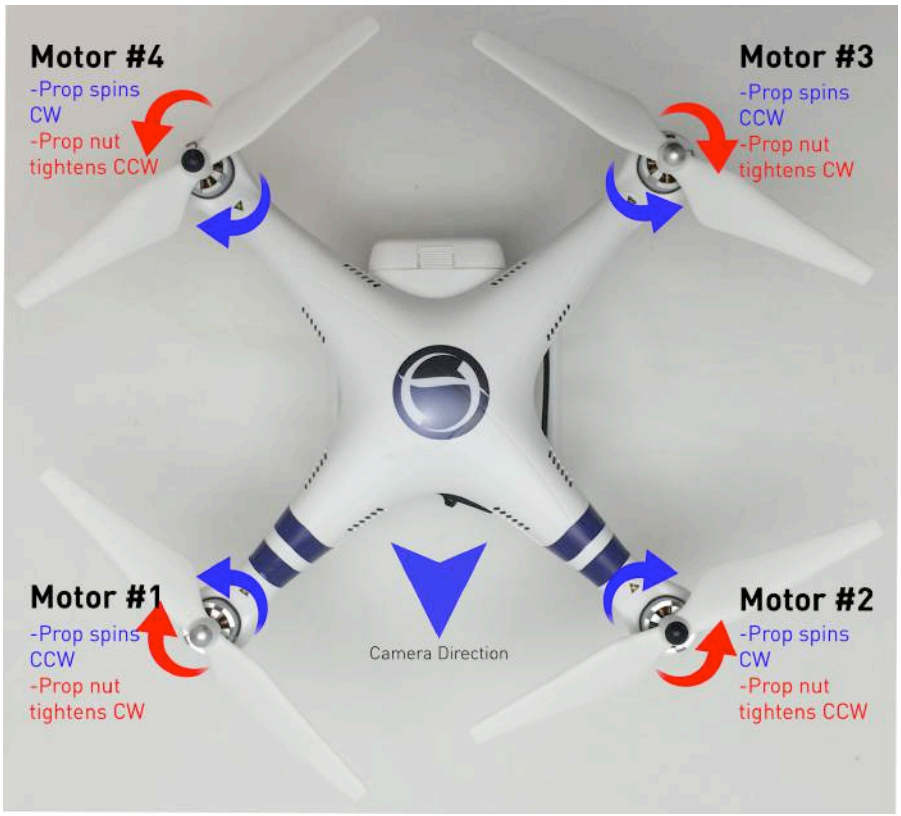

Use this knob to control the gimbal tilt safety stop. In the field we will typically adjust this so the camera is tilted at a 45 degree angle. This prevents the Phantom propellors from entering the shot when in forward flight due to the craft pitching forward.
Once you use the knob to set your maximum tilt angle you can then use the rear trim slider to control the full tilt of the camera from "Forward Looking" to "Bird's Eye" without having to watch where you stop the camera to avoid capturing the props in the shot.


Intelligent Orientation Control (IOC) Switch
1.) OFF
2.) Course Lock
3.) Home Lock
This feature is disabled by default but can be activated in the Naza Assistant software. Please see manual on how to activate this option for your Phantom.
FLIGHT MODE SWITCH
1.) GPS ATTI Mode (With RTH Failsafe Enabled)
2.) ATTI Mode (GPS and RTH Failsafe Disabled)
3.) ATTI Mode (Details Below)
The 3rd position of the flight mode switch can be programed through the Naza Assistant software to function as a manual "Failsafe" trigger option. See manual for details on how to activate this option for your Phantom.
Futaba

10. Propeller Installation

It is the owner's responsibility to be certain that the propeller blades are attached properly and securely fastened before every flight. All propeller blades are directional and can only be attached to one set of motors. Installing a propeller blade on the wrong motor can result in damage to the craft. If you are unsure about how to install your propeller blades, contact DSLRPros before attempting to fly your craft.

Proper direction for rotation is necessary when attaching propeller blades. When the front of the craft is facing the user, the motors are numbered 1 to 4 (counter clockwise), starting with the left hand motor. Motors 1 & 3 tighten by spinning clockwise while motors 2 & 4 tighten in a counter clockwise direction.



To attach the propellers, remove the warning discs from the motors and spin the propeller blades onto the corresponding motor in the direction indicated by the above image. Correct propeller installation is necessary for proper flight. Additional information can be found in the DJI User Manual.

When flying your craft in a populated area or if you are an inexperienced pilot, it is recommended to use the DJI propeller guards. The DJI propeller guards protect your propeller blades from damage and people and property from harm.

- To install your propeller guards, carefully place your craft upside down on a stable, flat surface.
- Under each motor, you will see 4 2mm Hex screws. Remove the two outermost screws from the base of each motor. Do not discard the removed screws.
- Use the propeller guard screws (note that these screws are longer than those that you just removed from the P2) to secure the propeller guards to the base of the motors.
- For added security, thread the white string included with your purchase through the eyes of the propeller guards.

11. Gimbal Installation & Removal

It is highly recommended that new pilots remove the lower half of the gimbal before flight practice so that in the event of a crash while learning to fly the Phantom 2, the Zenmuse H3-3D will not be damaged. Please refer to the Zenmuse H3-3D operator manual for detailed installation and removal procedures. The images and directions below are only supplemental to the manuals found on the DJI website.

Only the lower half of the gimbal is attached and secured in place via the rubber tension grommets, which have a lip that fits into the bracket rings. While these provide enough tension to secure the gimbal during flight, they can come loose if the craft is involved in a significant crash. The grey/black ribbon cable will be the only connection to the craft for power and video. This cable can be disconnected and reconnected after the lower half is removed from the brackets.

- To disconnect your gimbal, pinch the rubber tension grommets and pull them out of the top plate.
- Disconnect the ribbon cable from the gimbal by firmly pulling it out of the back of the gimbal. It is recommended that you disconnect the gimbal cable before performing any firmware updates. Failure to do so can result in damage to your gimbal.
- To reconnect your gimbal, pinch the rubber tension grommets back into place and reattach the ribbon cable.
- Be sure to attach the anti-drop pins before flying with your gimbal installed.

12. Updating Your Software

It is recommended that you periodically check for software updates using the DJI assistant software application. When upgrading the firmware on either the transmitter or the craft, be sure to disconnect the gimbal from the craft. Upgrading your software with the gimbal's ribbon cable still attached can permanently damage the gimbal.

- Plug the Phantom 2 into your PC or Mac using the USB cable provided.
- Power on the transmitter with the throttle all the way down.
- Power on the Phantom 2.
- Open the DJI Phantom software.

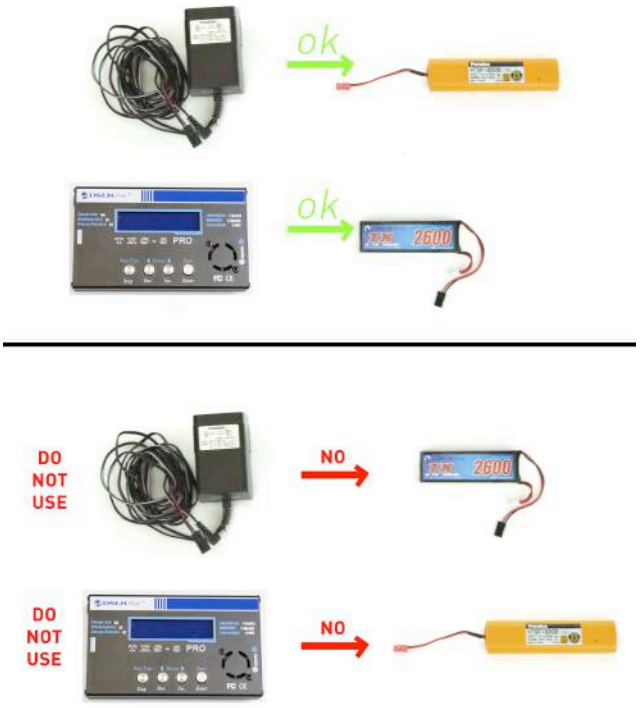
- Go to the “Upgrade” tab.
- If upgrades are available, check with DSLRPros to ensure that the upgrade is necessary before installing.
- After the upgrade is complete, power down your craft and transmitter before reattaching the gimbal.

13. Battery Safety

It is vital to the safety of your aerial craft, yourself, and others that you practice proper battery safety when using, charging, and storing all batteries used with your Phantom. Improper use, charging, and/or storage of batteries can result in damage to the battery or personal property. Please adhere to all battery safety guidelines in the included manuals. The estimated flight time for a Phantom 2 with H3-3D gimbal under ideal conditions is 11 minutes.

- Only charge your batteries using the included charging units. Failure to do so may result in fire.
- Never charge batteries unattended.
- If you notice that a battery is swelling or ballooning, immediately discontinue the charge, remove the battery from the charger, and observe the battery outside and away from any combustible materials for at least 15 minutes.
- In the event of a crash, remove the battery from the craft and observe it in a safe location looking for swelling or damage for at least 15 minutes before using the battery again.
- When storing your batteries for more than two weeks, you must reduce their charge to storage mode. Refer to your manual for proper battery storage procedures.

If your kit includes a Futaba transmitter with a Lithium Polymer Battery, please adhere to the guidelines outlined in your charging kit and only use the included Futaba charging station when charging a Futaba battery. It is always recommended to charge and store your LiPo batteries in a LiPo Safe Flame Resistant bag. Failure to do so can result in fire.



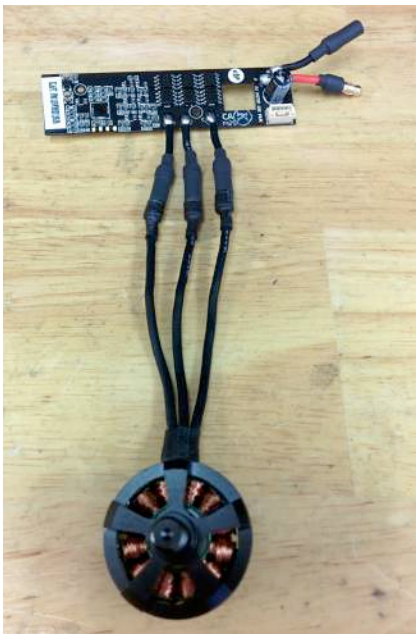
13. Using ESCs and Motors With Bullet Connectors

Your DSLRPros Expedition Kit comes with specially designed ESCs and motors. To replace damaged or malfunctioning ESCs or motors, you will need a 2mm Hex Head Screwdriver and a Philips Head Screwdriver.

Always remove the battery, gimbal, and propellers before attempting to open the Phantom 2.

1. Place the Phantom 2 upside down on a flat, even surface.
2. Use the Philips Head Screwdriver to remove the 4 screws located at the end of each arm. Place these and all screws in a safe location.
3. Use the 2mm Hex Head Screwdriver to remove the 2 screws on each arm located closest to motors. Move down the arm of the Phantom 2 towards the body of the craft and remove the 4 screws located near the landing skids. DO NOT remove the 4 screws directly under the motor. These hold the motor in place and removing them prematurely can cause damage to your craft.
4. Carefully hold the top and bottom of the Phantom 2 in place and flip the craft right side up.
5. Gently lift the top of the Phantom 2 up and over the motors.
6. You will see 2 wires running from the top shell into the main board of the Phantom 2. Do not disconnect these wires. Simply place the top shell out of the way but not putting stress on the cables.
7. To remove a motor, detach the motor from the ESC by pulling out the bullet connectors. Unscrew the 4 Hex screws directly under the motor.
8. To remove an ESC, unscrew the 2 screws holding it in place.
9. Pay close attention to the type of motor you are replacing. Clockwise spinning motors have a dimple on the top. Counter Clockwise spinning motors do not have a dimple.

CLOCKWISE



COUNTER CLOCKWISE

10. Position the new ESC in the exact location the damaged ESC occupied. Screw into place. Possition the motor so that the 4 holes under the motor line up properly with the holes in the shell. Screw the motor into place. After the motor and ESC are secured to the craft, connect the motor to the ESC and the ESC to the main board.
11. When your motors and ESCs have been replaced, put the top shell of the Phantom 2 back into place. Be sure that no wires are pinched when putting the shell back together. Gently turn the Phantom 2 upside down and replace all of the screws that were taken out.

DSLRPros Futaba 8FG Black Edition Super 14-Channel Ultimate Kit Replacement Transmitter

Pre-programmed Control Guide

(1) SE Toggle Switch (GPS, ATTI, ATTI): This is your flight mode control. The lowest ATTI position can be set to trigger "FAILSAFE" as an advanced feature. See you DJI Phantom "Advanced NAZA Assistant Manual" for further details.

(2) SA Toggle Switch (OFF, COURSE LOCK, HOME LOCK): This is your Intelligent Orientation Control or IOC. This mode is not enabled by default.

(3) SB and SC Toggle Switches (OFF, SMALL RADIUS, LARGE RADIUS): These switches control the advanced Point of Interest flight profiles. This function allows the operator to bank left or right using only the right joystick. Using the SB Toggle will allow the pilot to fly an inside pivot around a central object. Using the SC Toggle will enable you to fly an outside pivot. These functions are reserved for advanced users and NOT enabled at default.

(4) RD Knob: This knob sets the gimbal's stopping point for the camera tilt. The tilt is controlled by the trim lever on the rear right side of the Futaba.

(5) SD Toggle Switch (OFF, 30%, 50%): This enables the "Fluid Slow Pan" mode.

(6) Throttle and Pan Control Stick.

(7) Forward, Backward, Left and Right Control Stick.

(8) SH Toggle Switch: This is your timer reset. The Futaba comes with dual timers set to give you an audible alarm at 4 minutes and again at 8 minutes. Once you switch out a new battery, use the SH switch to zero out the timer. NOTE: The automatic timer should only be used as a reference point and should not be relied upon for accurate battery life. Under ideal conditions, a Phantom 2 with H3-3D axis installed will have 11 minutes of flight time.

Phantom 2 Flight Procedures

It is recommended that you follow this procedure when flying your craft.

- Be certain that the WiFi function on your GoPro is off. If you see a flashing blue light on your GoPro, this means the WiFi function is on and must be turned off before starting your craft.
- Check that batteries for transmitter and craft are fully charged and properly installed.
- Check that a camera is connected to gimbal.
- Check that antennas are connected to Lightbridge Ground and Air Stations.
- Check that propellers are securely fastened to motors.
- Place all switches on transmitter in their uppermost position with the throttle all the way down.
- Power on your transmitter.
- Power on your craft and wait for LED lights to stop flashing red, indicating that the Phantom 2 has achieved its GPS signal.
- Perform a compass calibration.
- With the craft on an even surface at least ten feet away from you, start the motors by moving the control sticks down and towards the center of the transmitter.
- Press up on the throttle to take off.